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10/738,370	12/15/2003	Robert T. Andrews	20009.0194US01(02-510)	9584

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AT&T Legal Department - WK
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EXAMINER	
ANTONIENKO, DEBRA L	

ART UNIT	PAPER NUMBER
3689	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/738,370	ANDREWS ET AL.	
	Examiner	Art Unit	
	DEBRA ANTONIENKO	3689	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *30 April 2009*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on April 30, 2009 has been entered.

2. This is a Non-Final Office Action in response to communications received April 30, 2009, wherein:

Claims 1, 8, and 15 have been amended;

Claims 3-5, 9-11, and 16 have been cancelled; therefore,

Claims 1, 2, 6-8, 12-15, and 17-20 are pending.

Response to Amendment

3. Amendments to independent Claims 1 and 8 are sufficient to overcome the 35 USC §101 rejections to Claims 1-2, 6-8, and 12-14 set forth previously in the Office Action of February 2, 2009.

4. Cancellation of Claim 16 renders the 35 USC §112, second paragraph, rejection set forth previously in the Office Action of February 2, 2009 moot.

Response to Arguments

5. Applicant's arguments with respect to *a computing device selecting the templates* have been considered but are moot in view of the new ground(s) of rejection.

Claim Objections

6. Claims 14, 17, and 18 are objected to because of the following informalities: dependency on cancelled claims. Appropriate correction is required.

Claim Rejections - 35 USC § 112

7. The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

8. Claims 1 and 8 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 1 and 8 recite the limitation "identifying one or more problems." It is unclear how the identifying of one or more problems is done.

Claim Rejections - 35 USC § 103

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

10. **Claims 1, 2, 6, and 7** are rejected under 35 U.S.C. 103(a) as being unpatentable over Shen et al., U.S. Patent Number 7,352,853 B1 (hereinafter Shen) in view of Glynn et al., U.S. Patent Number 6,658,192 B2 (hereinafter Glynn).

Regarding Claim 1, Shen teaches a method for provisioning a span for digital services, comprising: creating one or more segment templates, each segment template created to address one or more problems associated with span design, wherein each segment template represents a specific combination of network elements (column 22, lines 45-67, *one or more templates for CPE devices and service types are created or modified*); receiving an order for the digital services via a computing device (column 11, lines 35-46); identifying one or more problems related to a span design for the order (column 11, lines 47-57, *The service request is decomposed into a sequence of procedures or steps that further break down the provisioning procedure; Figure 5)*; and the computing device creating the span design by selecting the one or more segment templates that address the one or more problems identified for the span design for the order (column 11, lines 58-60; column 14, lines 36 – column 16, line 33; Figure 7).

Regarding Claim 2, Shen does not teach conducting an administrative review of the span design. However, Glynn teaches conducting an administrative review of the span design (column 24, lines 3-53). Shen discloses *entering and reviewing data in multiple EMS screens is required to provision PVC on the DSLAM* (column 10, lines 45-50). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Shen with that of Glynn to include reviewing the span design in order to avoid errors.

Regarding Claim 6, Shen further teaches wherein each component conforms to one or more rules (column 6, lines 37-50; Figure 4A, element 404, *roles and responsibilities*).

Regarding Claim 7, Shen does not teach conducting the administrative review of the span design, comprises checking whether each component conforms to one or more rules. However,

Glynn further teaches wherein conducting the administrative review of the span design, comprises checking whether each component conforms to one or more rules (column 24, lines 3-53). Shen discloses that devices have roles and responsibilities (column 6, lines 37-50; Figure 4A, element 404, *roles and responsibilities*). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Shen with that of Glynn to include reviewing the span design for conformity to one or more rules in order to avoid errors.

11. **Claims 8, 12-15 and 17-20** are rejected under 35 U.S.C. 103(a) as being unpatentable over Glynn et al., U.S. Patent Number 6,658,192 B2 (hereinafter Glynn) in view of McDonald et al., U.S. Patent Number 6,704,030 B1 (hereinafter McDonald) and further in view of Shen et al., U.S. Patent Number 7,352,853 B1 (hereinafter Shen).

Regarding Claim 8, Glynn teaches a method for creating a span design for digital services, comprising: … receiving an order for digital services; identifying one or more problems related to a span design for the order (*the software system describes the required standard components and prefabricated cables… the design and management device defines what is to be assembled*; and the computing device using order data (Abstract; column 22, lines 23-28; column 24, lines 3-6).

Glynn does not explicitly teach developing a hierarchy of one or more templates for use in creating span designs, the hierarchy comprising: element templates, segment templates and/or architecture templates.

However, McDonald discloses developing a hierarchy of one or more templates for use in creating span designs, the hierarchy comprising: element templates, segment templates and/or architecture templates …to select one or more of the templates as a span design for the order, (column 1, lines 46-63; column 6, lines 44-46 and lines 60-63; column 7, lines 11-49; column 8, lines 11-49). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Glynn with that of McDonald to use templates in order to facilitate span design.

Glynn nor McDonald disclose wherein an element template represents a singular device that is defined by a function of the singular device, a segment template represents a specific combination of one or more element templates that is defined by a problem that the segment template was created to address, and an architecture template represents a specific combination of one or more element templates and segment templates that is defined by a set of problems that the architecture template was created to address; wherein an element template is selected for the span design based on the function of the device, a segment template is selected for the span design based on at least one of the identified one or more problems corresponding to the problem that the segment template was created to address, and an architecture template is selected for the span design based on a set of the identified one or more problems corresponding to the set of problems that the architecture template was created to address.

However, it is implicit that network elements are created in the first place to provide a specific function or service and are defined as such. Therefore, an element or the element template is precisely selected as part of a span design for the function or service that it provides. Similarly, network segments and architectures or topologies are constructed or have been developed in a

particular way in order to resolve problems and to produce or not produce certain events. Therefore, it is obvious that one segment or architecture or topology or the respective template is selected over another precisely because of the problem it can resolve or the event it can produce or inhibit.

Neither Glynn nor McDonald teach receiving an order for digital services via a computing device. However, Shen discloses *receiving a service request from a order service system (OSS), customer care system or other software or hardware facility of a telecommunications service provider* (column 11, lines 35-46). Glynn teaches receiving an order for digital services (Abstract). It would have been obvious to one of ordinary skill in the art at the time of the invention to use a computing device to automate receiving orders in order to facilitate receiving orders.

Neither Glynn nor McDonald teach that the computing device selects the templates. However, Shen discloses that *configuration files are auto-generated using templates* (column 11, lines 58-60; column 14, lines 36 – column 16, line 33; Figure 7). It would have been obvious to one of ordinary skill in the art at the time of the invention to automate template selection in order to facilitate span design.

Regarding Claim 12, Glynn further teaches using the order data and an assignment of components as the span design for the order (Abstract; column 22, lines 23-28; column 24, lines 3-6). McDonald teaches to select the one or more templates (column 6, lines 44-46 and lines 60-63; column 8, lines 11-19). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Glynn's invention to incorporate McDonald's use of templates as building blocks in order to facilitate span design. Also, it would have been obvious to one of

ordinary skill in the art at the time of the invention to use order data and an assignment of components for creating span designs.

Regarding Claim 13, Glynn further teaches using the order data, the assignment of components, and equipment data as the span design for the order (Abstract; column 22, lines 23-28; column 24, lines 3-6). McDonald further teaches to select the one or more templates (column 6, lines 44-46 and lines 60-63; column 8, lines 11-19). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Glynn's invention to incorporate McDonald's use of templates as building blocks in order to facilitate span design. Also, it would have been obvious to one of ordinary skill in the art at the time of the invention to use order data, the assignment of components, and equipment for creating span designs.

Regarding Claim 14, Glynn further teaches wherein each component conforms to one or more rules (column 24, lines 3-30).

Regarding Claim 15, Glynn teaches a system for the provision of a span design for digital services, comprising: an assignment control system (ACS) executing within one or more computing devices (*software system*); an inventory module (IM) executing within the one or more computing devices (*reference database*); and a main server (*processor*), wherein the main server receives an order for the digital services from a user and provides order data from the order to the assignment control system (ACS), wherein the main server receives assignment data from the ACS, the assignment data identifying one or more components for the digital services… and forwards the assignment data to an inventory module (IM) which uses the assignment data to determine equipment data based at least in part on the assignment data,

and wherein the main server receives the equipment data from the IM and processes the order data, the assignment data, and the equipment data to create the span design for the digital services (Abstract; column 22, lines 23-28; column 24, lines 3-6; Figure 26).

Glynn does not teach one or more templates, each template representing a combination of network elements, each template defined by one or more common problems associated with span design that the template was created to address, and the selection of the one or more templates based on one or more problems of a span design for the order corresponding to the one or more common problems that the template was created to address.

However, McDonald discloses developing a hierarchy of one or more templates for use in creating span designs, the hierarchy comprising: element templates, segment templates and/or architecture templates ...to select one or more of the templates as a span design for the order, (column 1, lines 46-63; column 6, lines 44-46 and lines 60-63; column 7, lines 11-49; column 8, lines 11-49). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Glynn with that of McDonald to use templates in order to facilitate span design.

Furthermore, it is implicit that network elements are created in the first place to provide a specific function or service and are defined as such. Therefore, an element or the element template is precisely selected as part of a span design for the function or service that it provides. Similarly, network segments and architectures or topologies are constructed or have been developed in a particular way in order to resolve problems and to produce or not produce certain events. Therefore, it is obvious that one segment or architecture or topology or the respective template is selected over another precisely because of the problem it can resolve or the event it can produce or inhibit.

Neither Glynn nor McDonald teach that the main server creates the span design for digital services by selecting one or more templates. However, Shen discloses that *configuration files are auto-generated using templates* (column 11, lines 58-60; column 14, lines 36 – column 16, line 33; Figure 7). It would have been obvious to one of ordinary skill in the art at the time of the invention to automate template selection in order to facilitate span design.

Regarding Claim 17, McDonald further teaches wherein the templates comprise: one or more element templates; one or more segment templates; or one or more architecture templates (column 6, lines 44-46 and lines 60-63; column 8, lines 11-19). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Glynn with that of McDonald to use templates in order to facilitate span design.

Regarding Claim 18, McDonald further teaches wherein a template comprises a representation of the one or more components for the digital services (column 6, lines 44-46 and lines 60-63; column 8, lines 11-19). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Glynn with that of McDonald to use templates in order to facilitate span design.

Regarding Claim 19, McDonald further teaches wherein components used for implementation of the digital services are hierarchically organized based on elements, segments, and/or architectures (column 1, lines 15-22; column 7, lines 27-35). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Glynn with that of McDonald to use templates in order to facilitate span design.

Regarding Claim 20, Glynn further teaches wherein each of the components comply with one or more rules (column 24, lines 3-30).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DEBRA ANTONIENKO whose telephone number is (571)270-3601. The examiner can normally be reached on Monday through Thursday, 8:00 AM to 4:00 PM, EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Janice Mooneyham can be reached on 571-272-6805. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

DA

/Tan Dean D. Nguyen/
Primary Examiner, Art Unit 3689